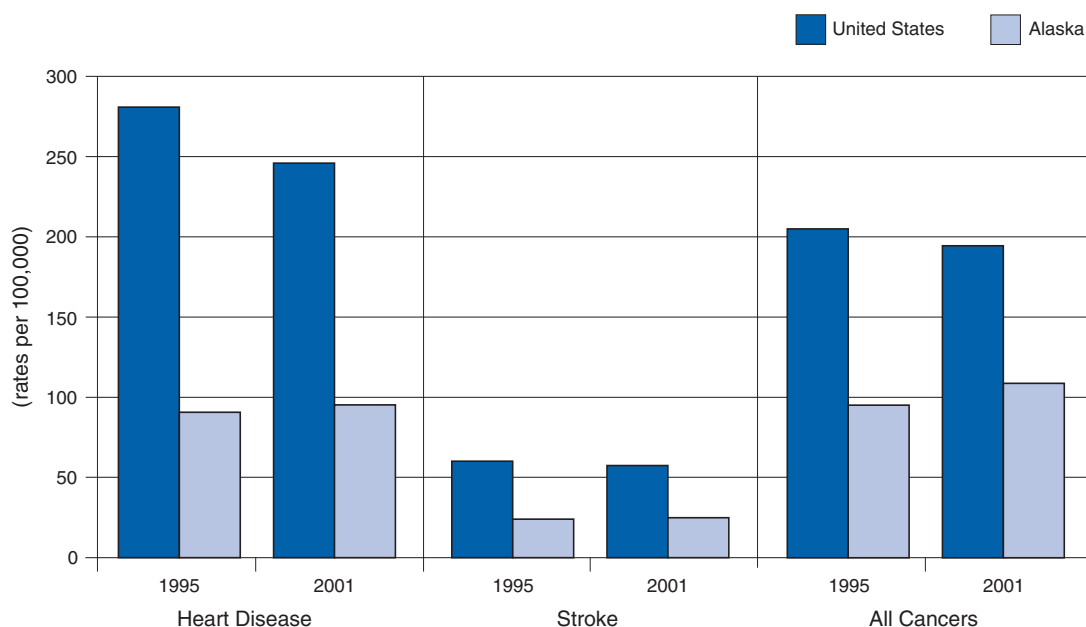


## Chronic Diseases: The Leading Causes of Death

### The Leading Causes of Death

United States and Alaska, 1995 and 2001



Source: National Center for Health Statistics, 2003

### The Burden of Chronic Disease

Chronic diseases—such as heart disease, stroke, cancer, and diabetes—are among the most prevalent, costly, and preventable of all health problems. Seven of every ten Americans who die each year, or more than 1.7 million people, die of a chronic disease.

### Reducing the Burden of Chronic Disease

Chronic diseases are not prevented by vaccines, nor do they just disappear. To a large degree, the major chronic disease killers are an extension of what people do, or not do, as they go about the business of daily living. Health-damaging behaviors—in particular, tobacco use, lack of physical activity, and poor nutrition—are major contributors to heart disease and cancer, our nation's leading killers. However, tests are currently available that can detect breast cancer, colon cancer, heart disease, and other chronic diseases early, when they can be most effectively treated.

# The Leading Causes of Death and Their Risk Factors

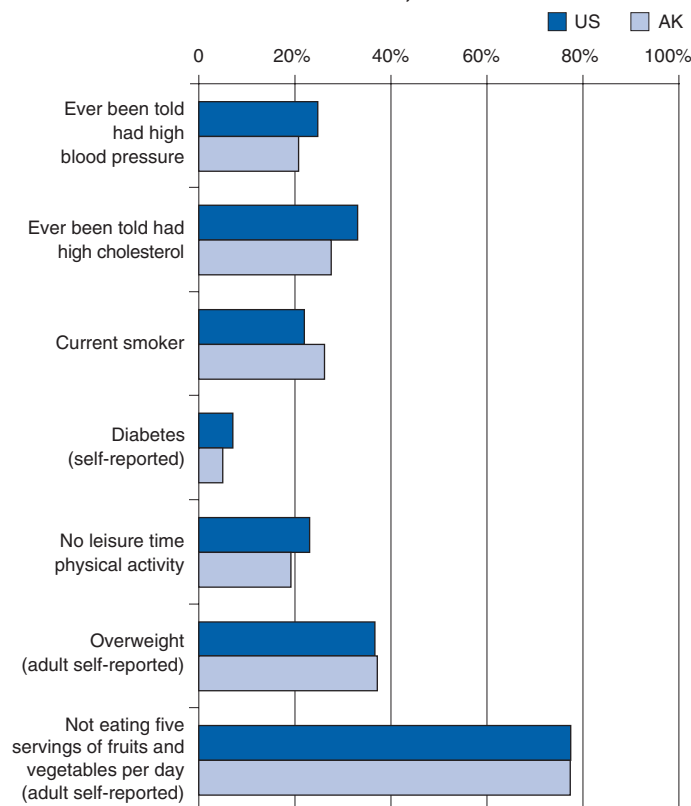
## Heart Disease and Stroke

Heart disease and stroke are the first and third leading causes of death for both men and women in the United States. Heart disease is the second leading cause of death in Alaska, accounting for 603 deaths or approximately 20% of the state's deaths in 2001 (the most recent year for which data are available). Stroke is the fourth leading cause of death, accounting for 158 deaths or approximately 5% of the state's deaths in 2001.

### Prevention Opportunities

Two major independent risk factors for heart disease and stroke are high blood pressure and high blood cholesterol. Other important risk factors include diabetes, tobacco use, physical inactivity, poor nutrition, and being overweight or obese. A key strategy for addressing these risk factors is to educate the public and health care practitioners about the importance of prevention. All people should also partner with their health care providers to have their risk factor status assessed, monitored, and managed in accordance with national guidelines. People should also be educated about the signs and symptoms of heart attack and stroke and the importance of calling 911 quickly. Forty-seven percent of heart attack victims and about the same percentage of stroke victims die before emergency medical personnel arrive.

Risk Factors for Heart Disease and Stroke, 2003



Source: BRFSS, 2004

## Cancer

Cancer is the second leading cause of death and is responsible for one of every four deaths in the United States. In 2004, over 560,000 Americans—or more than 1,500 people a day—will die of cancer. Of these annual cancer deaths, 780 are expected in Alaska. About 1.4 million new cases of cancer will be diagnosed nationally in 2004 alone. This figure includes 1,800 new cases that are likely to be diagnosed in Alaska.

Estimated Cancer Deaths, 2004

Cause of death	US	AK
All Cancers	563,700	780
Breast (female)	40,110	+
Colorectal	56,730	80
Lung and Bronchus	160,440	220
Prostate	29,900	+

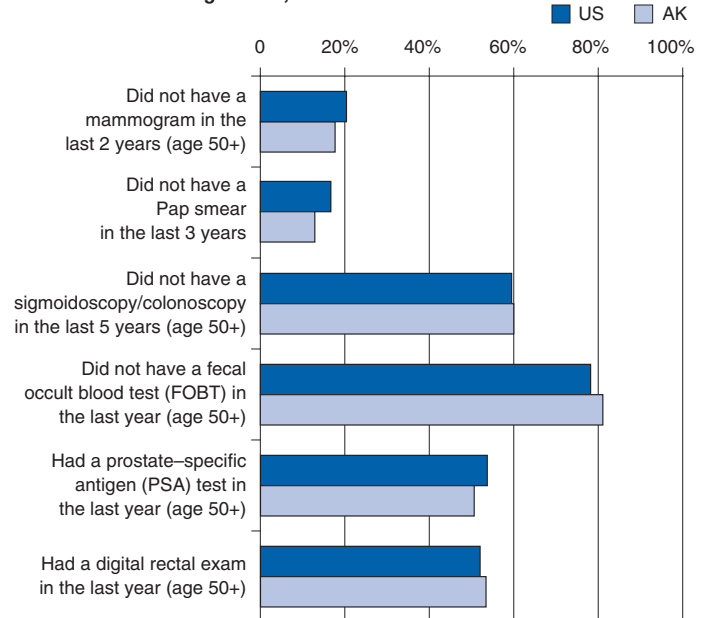
+ Represents fewer than 50 deaths.

Source: American Cancer Society, 2004

### Prevention Opportunities

The number of new cancer cases can be reduced and many cancer deaths can be prevented. Adopting healthier lifestyles—for example, avoiding tobacco use, increasing physical activity, achieving a healthy weight, improving nutrition, and avoiding sun overexposure—can significantly reduce a person's risk for cancer. Making cancer screening, information, and referral services available and accessible is essential for reducing the high rates of cancer and cancer deaths. Screening tests for breast, cervical, and colorectal cancers reduce the number of deaths by detecting them early.

Preventive Screening Trends, 2002



Source: BRFSS, 2003

# Alaska's Chronic Disease Program Accomplishments

## Examples of Alaska's Prevention Successes

- Lower mortality rates for heart disease, cancer, and stroke compared with national rates.
- A 14.0% decrease in the number of Alaska women older than age 50 who reported not having had a breast exam, from 31.4% in 1992 to 17.7% in 2002.
- Lower prevalence rates than the corresponding national rates for self-reported high blood cholesterol (27.6% in Alaska versus 33.1% nationally), high blood pressure risk (20.8% versus 24.8%), and diabetes (5.0% versus 7.1%).

## CDC's Chronic Disease Prevention and Health Promotion Programs

In collaboration with public and private health organizations, CDC has established a national framework to help states obtain the information, resources, surveillance data, and funding needed to implement effective chronic disease prevention programs and ensure that all Americans have access to quality health care. CDC funding and support enable state health departments to respond efficiently to changing health priorities and effectively use limited resources to meet a wide range of health needs among specific populations. The table below is a breakdown of the CDC's funding awards to Alaska in the areas of cancer, heart disease, stroke, and related risk factors.

### CDC Cancer, Heart Disease, Stroke, and Related Risk Factor Funding for Alaska, FY 2003

<b>SURVEILLANCE</b>	
Behavioral Risk Factor Surveillance System (BRFSS) <i>Alaska BRFSS</i>	\$217,936
National Program of Cancer Registries <i>Alaska Cancer Registry</i>	\$549,900
<b>CHRONIC DISEASE PREVENTION AND CONTROL</b>	
Cardiovascular Health Program <i>Take Heart Alaska</i>	\$300,000
Diabetes Control Program <i>Alaska Diabetes Prevention and Control Program</i>	\$450,000
National Breast and Cervical Cancer Early Detection Program <i>Breast and Cervical Health Check</i>	\$1,683,924
National Comprehensive Cancer Control Program <i>Alaska Comprehensive Cancer Control Program</i>	\$296,889
WISEWOMAN <i>Southeast Alaska Regional Health Consortium</i> <i>Southcentral Foundation in Alaska</i>	\$948,370
<b>MODIFYING RISK FACTORS</b>	
National Tobacco Prevention and Control Program <i>Alaska Tobacco Prevention and Control Program</i>	\$1,099,712
State Nutrition and Physical Activity/Obesity Prevention Program	\$0
Racial and Ethnic Approaches to Community Health (REACH 2010) <i>Chugachmiut, Inc.</i>	\$300,000
<b>Total</b>	<b>\$5,846,731</b>

The shaded area(s) represents program areas that are not currently funded. The above figures may contain funds that have been carried over from a previous fiscal year.

### Additional Funding

CDC's National Center for Chronic Disease Prevention and Health Promotion funds additional programs in Alaska that fall into other health areas. A listing of these programs can be found at <http://www.cdc.gov/nccdphp/states/index.htm>.

# Opportunities for Success

## Chronic Disease Highlight: Cardiovascular Disease

Alaska, in comparison with other states, has one of the lowest death rates for cardiovascular disease (CVD), including heart disease and stroke. Alaska also is the only state for which heart disease is not the leading cause of death. However, of the approximately 3,000 Alaskans who will die this year, 800 to 900 are likely to die of CVD.

Heart disease and stroke affect men differently than women in Alaska. In addition, American Indian/Alaska Natives (AI/ANs) and African Americans experience CVD disparities in Alaska. From 1996 to 2000, men in Alaska had a heart disease death rate of 487 per 100,000, compared with 333 per 100,000 for women. AI/AN men had the highest heart disease death rate (569 per 100,000) among men, and African American women had the highest heart disease death rate among women (434 per 100,000). Unlike heart disease, women have higher stroke death rates than men. Between 1991 and 1998, women had a stroke death rate of 131 per 100,000, compared with 116 per 100,000 for men. Among men and women, AI/ANs had the highest stroke death rate (133 per 100,000 for men and 177 per 100,000 for women).

Of the more than 46,600 hospitalizations in Alaska in 2001, about 11% were primarily for heart disease and stroke. In 2001 in Alaska, the mean length of stay in the hospital for heart disease was 4.4 days, and for stroke it was 7.4 days. The average charge per hospital stay in Alaska in 2001 was approximately \$37,174 for heart disease and \$29,807 for stroke.

The Alaska Department of Health began receiving funds from CDC in 2002 to support a state heart disease and stroke prevention program. Alaska initiatives to reduce CVD prevalence include the Alaskan Cardiovascular Disease Prevention Plan, which encourages Alaskans to adopt healthy lifestyle choices such as physical activity and a low-fat diet. The program also coordinates the state-level Take Heart Alaska Coalition, which works to increase heart health among all Alaskans by advocating for individual, worksite, community-based commitment to healthy lifestyles and improving access to preventive services. Additionally, the program has partnered with the Rural Health Program to develop prevention and follow-up protocols for cholesterol and blood pressure in rural clinics.

Text adapted from *The Burden of Cardiovascular Disease in Alaska: Mortality, Hospitalization and Risk Factors* (2004).

## Disparities in Health

American Indians and Alaska Natives make up 14% of Alaska's population. In addition to having higher prevalence rates for risk factors for heart disease and stroke—poor nutrition, physical inactivity, obesity, and smoking—more AI/ANs in Alaska die from heart disease and stroke than whites.

A 2001 report from the Alaska Department of Health and Social Services, Division of Public Health provided data from CDC's Behavioral Risk Factor Surveillance System that highlighted the health disparities experienced by the state's AI/AN population. From 1991 to 1998, AI/ANs in Alaska were more likely than whites to report inadequate leisure time physical activity (59% of AI/ANs, compared with 49% of whites) and were less likely to consume 5 or more servings of fruits and vegetables per day (19% of AI/ANs, compared with 24% of whites). Based on these two risk factors, AI/ANs in Alaska were also more likely to be overweight than whites (36% versus 29%). From 1991 to 1998, AI/ANs also had higher smoking rates than whites (42% versus 25%).

Given the above disparities in risk factors for chronic diseases, the differences between whites and AI/ANs in heart disease and stroke death rates are not surprising. From 1996 to 2000, AI/ANs in Alaska had a heart disease death rate of 468 per 100,000, compared with 408 per 100,000 for whites. This heart disease death rate was also higher than the national heart disease death rate for AI/ANs (352 per 100,000). From 1991 to 1998, the stroke death rate for AI/ANs (158 per 100,000) was higher than the rate for whites (118 per 100,000). As with heart disease, the stroke death rate for AI/ANs in Alaska was also higher than the stroke death rate for AI/ANs nationally (79 per 100,000).

The AI/AN population in Alaska also experiences higher cancer death rates than their white counterparts. From 1990 to 1998, AI/ANs had a cancer death rate of 204 per 100,000, compared with the rate for whites, 163 per 100,000.

## Other Disparities

- **Diabetes:** From 1991 to 1998, African Americans in Alaska had higher rates of diabetes (6.1%) than Hispanics (3.7%), AI/ANs (3.5%), whites (3.3%) and Asian/Pacific Islanders (1.6%).
- **Prostate Cancer:** From 1990 to 1998, African American men had a prostate cancer death rate that was more than twice as high as the rate for white men (48 per 100,000 versus 22 per 100,000).

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